

Substitute for Form 1449/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(use as many sheets as necessary)

Sheet	1	of	1	Attorney Docket Number	005158.P005
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Complete if Known

Application Number	10/051,348
Filing Date	January 17, 2002
First Named Inventor:	Xiaodong Li
Art Unit	2154 2663
Examiner Name	Not Yet Assigned CB G PA

157 ATTACH

U.S. PATENT DOCUMENTS

Examiner Initials*	Cite No. ¹	Document Number		Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code ² (if known)				
Q3	Q1 PCE	us-	5,734,967	3/31/1998	Kotzin et al.	RECEIVED
Q3	SC09	us-	5,886,988	3/23/1999	Yun et al.	JAN 28 2004
Q3	SC09	us-	5,887,245	3/23/1999	Lindroth et al.	
Q3	JAN 26 2004	us-	5,933,421	8/3/1999	Alamouti, et al.	Technology Center 2100
Q3	TELENT TRADEMARK OFFICE	us-	6,061,568	5/9/2000	Dent	
Q3	SC09	us-	6,108,374	8/22/2000	Balachandran et al.	
Q3	SC09	us-	6,226,320 B1	5/1/2001	Hakkinen et al.	
Q3	SC09	us-	6,366,195 B1	4/2/2002	Harel et al.	
Q3	SC09	us-	6,477,158 B2	11/5/2002	Take	
Q3	SC09	us-	2003/0067890 A1	4/10/2003	Goel et al.	
Q3	SC09	us-	2003/0169824 A1	9/11/2003	Chayat	
		us-				
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FOREIGN PATENT DOCUMENTS

Examiner Initials*	Cite No. ¹	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T ⁶
		Country Code ³ Number ⁴ Kind Code ⁵ (if known)				
Q3	JP	06029922	2/4/1994	Mitsuru et al.		

Examiner Signature	Gopin Shettigar	11/24/2005	Date Considered	11/24/2005
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*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. ¹Applicant's unique citation designation number (optional). ²See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. ³Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). ⁴For Japanese patent documents, the indication of the year of reign of the Emperor must precede the serial number of the patent document. ⁵Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. ⁶Applicant is to place a check mark here if English language translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS.

SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

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FOREIGN PATENT DOCUMENTS							
Exam. Initial*	Cite No. ¹	Foreign Patent Document		(If known)	Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Office ³	Number ⁴ Kind Code ⁵				
g3	KK	FR	2 777 407	A1	Wavecom SA	10/15/1999	
g3	LL	EP	0 929 202	A1	Lucent Technologies, Inc.	07/14/1999	
g3	MM	WO	02 49305	A2	Broadstorm Telecommunications	06/20/2002	

Examiner Signature	Gopi Bhattacharya 11/24/2005	Date Considered 11/24/2005	
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Substitute for Form 1449A/PTO (Modified)

OCT 30 2002

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

(use as many sheets as necessary)

Complete if Known

Application Number	10/051,348
Filing Date	January 17, 2002
First Named Inventor:	Xiaodong Li
Group Art Unit	2154
Examiner Name	Unassigned

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Sheet 2 of 2

Attorney Docket Number 005158.P005

Technology Center 2100

OTHER ART - NO PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published	T ²
GB	NN	GRUENHEID, R. et al: "Adaptive Modulation and Multiple Access for the OFDM Transmission Technique", Wireless Personal Communications, Kluwer Academic Publishers, NL, Vol. 13, NR. 1/2, Year 2000, pages 5-13 XP000894156, ISSN: 0929-6212.	
GB	OO	MOTEGI, M. et al.: "Optimum Band Allocation According to Subband Condition for BST-OFDM" 11 th IEEE International Symposium on Personal Indoor and Mobile Radio Communications, vol. 2, 18-21 September 2000, pages 1236-1240, XP002213669, Piscataway, NJ, USA, ISBN: 0-7803-6463-5.	
GB	PP	KAPOOR, S. et al.: "Adaptive Interference Suppression in Multiuser Wireless OFDM Systems Using Antenna Arrays" IEEE Transactions on Signal Processing, vol. 47, no. 12, December 1999, pages 3381-3391, XP000935422, IEEE, New York, USA, ISSN: 1053-587X.	
GB	QQ	YE LI, et al.: "Clustered OFDM with channel estimation for high rate wireless data", Mobile Multimedia Communications, 1999. (MOMUC '99). 1999 IEEE International Workshop on San Diego, CA, USA, IEEE, US, 15 November 1999, pages 43-50, XP010370695, ISBN: 0-7803-5904-6.	
GB	RR	NOGUEROLES, R. et al.: "Improved Performance of a Random OFDMA Mobile Communication System" Vehicular Technology Conference, 1998. VTC 98. 48 th IEEE Ottawa, Ontario, Canada, 18-21 May 1998, (1998-05-18), pages 2502-2506, XP010288120, ISBN: 0-7803-4320-4.	
GB	SS	KINUGAWA, Y. et al.: "Frequency and Time Division Multiple Access with Demand-Assignment Using Multicarrier Modulation for Indoor Wireless Communications Systems", IEICE Transactions on Communications, Institute of Electronics Information and Comm. Eng. Tokyo, Japan, vol. E77-B, NR. 3, March 1994, pages 396-402, XP000451014, ISSN: 0916-8516.	
			<i>RECEIVED</i>
			NOV 07 2002
			Technology Center 2600

Examiner Signature

Gopu Bhattacharjee

Date Considered

11/28/05

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Substitute for Form 1449A/PTO (Modified)				<i>Complete if Known</i>		
				Application Number	10/051,348	
				Filing Date	January 17, 2002	
				First Named Inventor:	Xiaodong Li	
				Group Art Unit	2154 263	
				Examiner Name	Unassigned GLOPA BHATTACHARJEE	
				Attorney Docket Number	Technology Center 2600 005158.P005	
Sheet 1 of 2		U.S. PATENT DOCUMENTS				
Exam. Initial*	Cite No. ¹	U.S. Patent Document		Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number Code ²	Kind (if known)			
G3	H	6,377,632	B1	Paulraj et al.	04/23/2002	
G3	I	6,131,016		Greenstein et al.	10/10/2000	
G3	J	6,067,290		Paulraj et al.	05/23/2000	
G3	K	6,064,694		Clark et al.	05/16/2000	
CP	L	6,064,692		Chow	05/16/2000	
G3	M	6,052,594		Chuang et al.	04/18/2000	
G3	N	6,041,237		Farsakh	03/21/2000	
CP	O	6,026,123		Williams	02/15/2000	
G3	P	6,005,876		Cimini Jr. et al.	12/21/1999	
G3	Q	5,973,642		Li et al.	10/26/1999	
G3	R	5,956,642		Larsson et al.	09/21/1999	
G3	S	5,914,933		Cimini et al.	06/22/1999	
G3	T	5,726,978		Frodigh et al.	03/10/1998	
G3	U	5,708,973		Ritter	01/13/1998	
G3	V	5,555,268		Fattouche et al.	09/10/1996	
G3	W	5,504,775		Chouly et al.	04/02/1996	
G3	X	5,479,447		Chow et al.	12/26/1995	

Examiner Signature	Gopan Bhattacharjee 11/24/2005	Date Considered 11/24/2005
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SEP 18 2002

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(use as many sheets as necessary)

Sheet 2 of 2

Application Number	10/051,348
Filing Date	January 17, 2002
First Named Inventor:	Xiaodong Li
Group Art Unit	2154 SEP 26 2002
Examiner Name	Unassigned Technology Center 2600
Attorney Docket Number	005158.P005

OTHER ART – NO PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published	T ²
g3	BB	BENDER et al., <i>CDMA/HDR: A Bandwidth-Efficient High-Speed Wireless Data Service for Nomadic Users</i> , IEEE Communications Magazine, July 2000, pp. 70-87.	
g3	CC	WONG, C.Y., et al., <i>Multiuser OFDM With Adaptive Subcarrier, Bit, and Power Allocation</i> , IEEE Journal on Selected Areas in Communications, October 1999, IEEE Inc., New York, USA, Vol. 17, Nr. 10, pages 1747-1758, XP000854075, ISSN: 0733-8716 Sections I and II abstract.	
g3	DD	TSOULOS, G.V., <i>Smart Antennas For Mobile Communication Systems: Benefits And Challenges</i> , Electronics & Communication Engineering Journal, April 1999, pp. 84-94.	
g3	EE	SHAD et al., <i>Indoor SDMA Capacity Using a Smart Antenna Basestation</i> , 1997 IEEE, pp. 868-872.	
g3	FF	FARSAKH, CHRISTOF and NOSSEK, JOSEF A., <i>On the Mobile Radio Capacity Increase Through SDMA</i> , no date (after 1997).	
g3	GG	FRULLONE et al., <i>PRMA Performance in Cellular Environments with Self-Adaptive Channel Allocation Strategies</i> , IEEE Transactions on Vehicular Technology, November 1996, pp.657-665 Vol. 45, No. 4.	
g3	HH	XU, GUANGHAN and LI, SAN-QI, <i>Throughput Multiplication of Wireless Lans for Multimedia Services: SDMA Protocol Design</i> , 1994 IEEE, pp. 1326-1332.	
g3	II	WARD, JAMES and COMPTON, R. TED, JR., <i>High Throughput Slotted ALOHA Packet Radio Networks with Adaptive Arrays</i> , IEEE Transactions on Communications, March 1993, pp. 460-470, Vol. 41, No. 3.	
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		SEP 23 2002	
		Technology Center 2100	

Examiner Signature	Gopan Bhattacharya	Date Considered	11/28/05
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